NORTH PACIFIC OCEAN

By WILLIS E. HURD

February, 1928, was the third stormy month of the season on the North Pacific Ocean, the others being November and December. January, while rough, had fewer gales exceeding force 10 than any of the other three. In February gales of various strengths were frequent over all the middle and northern parts of the ocean, but wind velocities of force 11 to 12 were reported on at least nine days, these occurring principally within the boundaries of the thirtieth and fiftieth parallels, and longitudes 160° W. to 150° E. In this general region the heaviest weather was experienced south of the Aleutian Islands on the 3d, 9th, and 11th, and between the thirtieth and forty-fifth parallels, west of the one hundred and eightieth meridian, on the 16th and 17th and from the 24th to the 28th. The northernmost gales were due to intensifications of the Aleutian LOW; the others to strong progressive cyclones coming from Asiatic sources. Most of the far eastern cyclones of the month entered the ocean in middle to higher latitudes, and as they moved outward, in addition to other gales, caused local increases in the intensity of the northeast monsoon to gale force from Japan southward to Luzon. The monsoon, however, was fresh to strong almost throughout February, pressure being high off the China coast, and barometric gradients sharp to the eastward and northeastward. The moderate cyclone mentioned last nonth as laying off the California coast at the end of January, went inland near San Francisco on February 4, and after crossing the United States, entered the North Atlantic Ocean on the 9th.

The Aleutian cyclone, as in January, was central in the neighborhood of Dutch Harbor, and abnormally deep, the average lowest pressure being 29.30 inches, or about a third of an inch under the average for a period of years. Thence eastward toward the lower Alaskan coast pressure as a whole rose rapidly, being 29.63 inches midway, at Kodiak, and 30.06 at Juneau. The North Pacific anticyclone was generally well developed, with average pressures mostly above the normal along lower middle latitudes from California nearly to Midway Island, and up along the American coast to and beyond Juneau.

Table of pressure data for several island and coast stations in west longitudes follows:

TABLE 1.—*Averages, departures, and extremes of atmospheric pressure at sea level at indicated hours, North Pacific Ocean, February, 1928*

Stations	Average pressure	Departure from normal	Highest	Date	Lowest	Date
	Inches	*Inch*	*Inches*		*Inches*	
Dutch Harbor [1]	29.30	−0.32	30.29	9th [4]	28.50	24th.
St. Paul [1]	29.39	−0.27	30.32	8th	28.64	21st. [4]
Kodiak [1]	29.63	−0.07	30.40	17th	28.84	5th.
Midway Island [1]	30.02	−0.01	30.26	8th [4]	29.76	28th. [4]
Honolulu [2]	30.07	+0.03	30.18	25th	29.92	14th.
Juneau [2]	30.06	+0.14	30.64	16th	29.25	4th.
Tatoosh Island [2 3]	30.18	+0.20	30.55	8th	29.42	3d.
San Francisco [2 3]	30.13	+0.06	30.47	6th	29.52	3d.
San Diego [2 3]	30.07	+0.03	30.35	5th	29.75	2d.

[1] P. m. observations only.
[2] A. m. and p. m. observations.
[3] Corrected to 24-hour mean.
[4] And other dates.

The prevailing wind direction at Honolulu was from the east, with the maximum velocity at the rate of 24 miles an hour from the east, on the 1st. Unusually warm weather continued to prevail off the coast of southeastern Alaska. At Juneau this was the third warmest February of record.

Moderate to severe northers, although not so frequent as in the preceding month, occurred on several days in the Gulf of Tehuantepec.

There was comparatively little fog on the ocean, as is usual in February. Isolated instances of its formation were reported from the Aleutians eastward and southeastward, with the place of maximum occurrence west of the central California coast, where there were at least seven days with it. Fog was reported on four days west of Lower California, and also on four days in the Gulf of Tehuantepec.